

CLAIM AMENDMENTS

Claim 1. (currently amended) A method for forming, in a production line, profiles (50) with a cross-section that varies along the length thereof, said profiles being formed from a plane metal strip (10) that is unwound from a coil (9), said method employing edge cutters (14) and a plurality of roll-forming units (17-24), the edge cutters and the roll-forming units being individually displaceable sideways relative to the strip,

the steps of said method comprising:

controlling the roll-forming units and the edge cutters for cutting along a predetermined curved line for forming a first corner (53, 56) to each side of the center of said metal strip (10) in a first roll-forming section of said production line, and

controlling the roll-forming units and the edge cutters for cutting along a predetermined curved line to form a second corner (54, 58) to each side of the center of said metal strip between said first corners, after said first corners have been formed.

Claim 2. (previously presented) The method according to claim 1, further including the steps of cutting a transverse slit (61, 62) in the strip (10) before forming the first and second corners, without fully severing the strip, and severing the strip with a terminal cutter (30) after

the first and second corners are formed to remove a trailing end from the length of said profile formed from the strip.

Claim 3. (previously presented) The method according to claim 2, in which the lengths of the profile formed have different widths of extent at opposed ends of said profile, the steps of said method including adjusting the width of the strip between one slit (60) that defines the trailing end of the length of one said profile, cutting a further slit (61) to define a leading end of the length of a subsequent said profile, and thereafter cutting the strip at both said slits with the terminal cutter (30).

Claim 4. (previously presented) The method according to claim 1, further including the steps of thinning a portion of the profile by a pair of rollers (83, 85; 84, 82) for bending the profile as said profile is fed forwards in the production line.

Claim 5. (previously presented) The method according to claim 4, further including the steps of controlling the bending of the profile by varying a gap between said pair of rollers (83, 85; 84, 82) through which said profile passes as the profile (50) is fed forwards in the production line.

Claim 6. (previously presented) The method according to claim 4, further including the steps of forming the profile (50) with a central flange (76) and flanking pieces (77, 79) as the

strip (10) is fed forwards in the production line, and thinning one end of each said flanking piece by rolling.

Claim 7. (previously presented) The method according to claim 4, further including the steps of forming the profile (50) with a central flange (76) and flanking pieces (77, 79) as the strip is fed forwards in the production line, and thinning a complete one of said flanking pieces by rolling.

Claim 8. (previously presented) The method according to claim 5, further including the step of controlling the positions of the pair of rollers (83, 85; 84, 82) by the profile.

Claim 9. (withdrawn) A production line for the continuous forming of profiles that have a cross-section that varies along the length from a plane metal strip (10) that is unwound from a coil (9), comprising an unwinder (11), an alignment device (12), a stamp (13) for the transverse cutting of the strip, and an edge cutter station (14) for cutting the edges of the strip, followed by a roll-forming section (17-24), whereby the edge cutter station and the roll-forming unit can be individually displaced and guided in a sideways direction in order to vary continuously the final appearance of the profile (50) that is being manufactured

characterised by

a bending station (25) after the roll-forming section (17-24), that comprises rollers (35-40) that can be guided to roll sections of the profile (50) to become thinner such that the profile is in this way bent or twisted as it is formed.

Claim 10. (withdrawn) The production line according to claim 9, characterised in that the bending station (25) comprises a pair of rollers (83, 85; 84, 82) on each side of the profile.

Claim 11. (withdrawn) The production line according to claim 10, characterised in that the pairs of rollers are mounted such that they can be displaced, and are connected to means arranged to be guided by the profile (50).

Claim 12. (withdrawn) The production line according to claim 10, characterised in that the bending station comprises two bending units (26, 27), one mounted after the other along the line.

Claim 13. (previously presented) The method according to claim 5, further including the steps of forming the profile (50) with a central flange (76) and flanking pieces (77, 79) as the strip (10) is fed forwards in the production line, and thinning one end of each said flanking piece by rolling.

Claim 14. (previously presented) The method according to claim 5, further including the steps of forming the profile (50) with a central flange (76) and flanking pieces (77, 79) as the

strip is fed forwards in the production line, and thinning a complete one of said flanking pieces by rolling.

Claim 15. (previously presented) The method according to claim 6, further including the step of controlling the positions of the pair of rollers (83, 85; 84, 82) by the profile.

Claim 16. (previously presented) The method according to claim 7, further including the step of controlling the positions of the pair of rollers (83, 85; 84, 82) by the profile.

Claim 17. (previously presented) The method according to claim 13, further including the step of controlling the positions of the pair of rollers (83, 85; 84, 82) by the profile.

Claim 18. (previously presented) The method according to claim 14, further including the step of controlling the positions of the pair of rollers (83, 85; 84, 82) by the profile.

Claim 19. (withdrawn) The production line according to claim 11, characterised in that the bending station comprises two bending units (26, 27), one mounted after the other along the line.